

Notice of Allowability	Application No.	Applicant(s)	
	10/042,080	BERRY ET AL.	
	Examiner	Art Unit	
	John P. Trimmings	2133	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--
All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to amendment dated 3/28/2005 and RCE dated 6/16/2005.
2. ☒ The allowed claim(s) is/are 1-10.
3. ☒ The drawings filed on 1/7/2002 are accepted by the Examiner.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☐ All b) ☐ Some* c) ☐ None of the:
 1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|---|--|
| <ol style="list-style-type: none"> 1. <input type="checkbox"/> Notice of References Cited (PTO-892) 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) 3. <input type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),
Paper No./Mail Date _____ 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit
of Biological Material | <ol style="list-style-type: none"> 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) 6. <input checked="" type="checkbox"/> Interview Summary (PTO-413),
Paper No./Mail Date _____ 7. <input checked="" type="checkbox"/> Examiner's Amendment/Comment 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance 9. <input type="checkbox"/> Other _____ |
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DETAILED ACTION

This office action is in response to the applicant's amendment dated 3/28/2005, and RCE dated 6/16/2005.

The applicant amended claims 1 and 5-10.

The applicant has canceled claim 11.

Claims 1-10 are pending.

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/28/2005 has been entered.

Response to Amendment

As per Claim Objections:

In view of the applicant's changes to Claims 7 and 10, the examiner withdraws the objection to said claims.

As per Claim Rejections under 35 USC 112:

In view of the applicant's amendment to Claims 6, 7, 10 and 11, the examiner withdraws the rejection of Claims 6, 7 and 10. In view of Claim 11 being canceled, the examiner withdraws the rejection of said Claim 11 as moot.

Response to Arguments

2. Applicant's arguments, see amendment dated 3/28/2005, with respect to Claims 1-10 have been fully considered and are persuasive. The rejection under 35 USC 103 of Claims 1-10 has been withdrawn.

EXAMINER'S AMENDMENT

3. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it **MUST** be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Dustin Mauck on 7/28/2005. The application has been amended as follows: Claim 10 was the subject of an agreement by Mr. Mauck with the examiner wherein the claim is amended as follows:

10. (Currently Amended) A method for enhancing test coverage in a level-sensitive scan design (LSSD), the method comprising the steps of:

receiving and temporarily storing a first scan data bit;

transmitting the first scan data bit from a first SRL through a logic unit to a second SRL

if there is a logic 0 control signal;

receiving and temporarily storing a second scan data bit;

generating an inverted bit of the first scan data bit if there is a logic 1 control signal;

generating a first output data bit by receiving the first and second scan data bits;

transmitting the first output data bit to a last SRL within the SRL chain;

generating a second output data bit by receiving the inverted bit and the second scan data bit;

transmitting the second output data bit to the last SRL within the SRL chain; and

enhancing test coverage of combinational logic by obtaining a result from both the first and second output data bits.

Allowable Subject Matter

4. Claims 1-10 are allowed.

The following is an examiner's statement of reasons for allowance: The reference art of Savir(1) and Savir(2) and Song teach a method based on a circuit for enhancing the testing in a LSSD design by receiving test vector bits in an SRL, passing the bit to a combinational circuit, as well as to a next SRL, the next SRL receiving the bit, or an inverted bit under control of a control signal, the next SRL also passing an output bit to the combinational circuit, and the output of the combinational circuit being passed to an SRL latch. However, the prior arts of record taken alone, or in combination failed to teach, anticipate, suggest, or render obvious the claimed invention or the method steps of the application. Specifically, as per Claims 1, 6 and 10, the prior arts failed to teach, anticipate, suggest, or render obvious the limitation introduced into these claims,

namely: the output of the combinational circuit is passed to the last SRL latch in the SRL chain. Consequently, Claims 1, 6 and 10 are allowed over the prior arts of record. Claims 2-5 and 7-9 are directly or indirectly dependent upon Claims 1, 6 and 10, and therefore are also allowable over the prior arts of record. Therefore claims 1-10 are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to John P. Trimmings whose telephone number is (571) 272-3830. The examiner can normally be reached on Monday through Thursday, 7:30 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Albert DeCady can be reached on (571) 272-3819. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Application/Control Number: 10/042,080
Art Unit: 2133

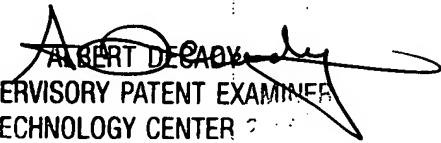
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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



John P Trimmings
Examiner
Art Unit 2133

jpt



ALBERT DECADY
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER